Amendments to the Claims:

Claims 50-63 and 74 are cancelled, without prejudice.

Claim 76 is currently amendment for presentation in independent form.

This Listing of Claims will replace all prior versions, and listings, of claims in the application.

Listing of Claims:

Claims 1-63 (canceled).

Claim 64(previously presented). A plasmid DNA polynucleotide which cannot replicate in eukaryotic cells *in vivo* and which comprises contiguous nucleic acid sequences capable of being expressed to produce a gene product upon introduction of the polynucleotide into eukaryotic tissues *in vivo*, wherein the gene product either acts as an immunostimulant or as an antigen capable of generating an immune response, wherein the nucleic acid sequences encode:

a) a spliced REV gene;

b) a spliced human immunodeficiency virus (HIV) immunogenic epitope; and,

c) optionally, a cytokine or a T-cell recognition element.

Claim 65(previously presented). The plasmid DNA polynucleotide of Claim 64 wherein the HIV immunogenic epitope of step b) is a gene product expressed from an HIV gene selected from the group of HIV genes consisting of gag, gag-protease, and env or an immunogenic subportion thereof; the cytokine is interleukin-12, and the T-cell costimulatory element is a B7 protein.

Claim 66(previously presented). The plasmid DNA polynucleotide of Claim 65 wherein the env immunogenic epitope is a gene product expressed from an env open reading frame selected from the group consisting of HIV gp160, HIV gp120 and HIV gp41.

Claim 67(previously presented). The plasmid DNA polynucleotide of Claim 65 wherein the gag immunogenic epitope is p17, p24, or p15.

Claim 68(previously presented). A plasmid DNA polynucleotide comprising a first gene encoding an HIV gag, gag-protease, or env immunogenic epitope, the first gene containing a REV responsive element (RRE) or having been modified to contain an RRE, the first gene being operatively linked with a transcriptional promoter suitable for gene expression in a mammal, the first gene being linked with an internal ribosome entry site (IRES), and the IRES being linked with a second gene encoding a REV gene product, wherein said polynucleotide is non-replicating in eukaryotic cells *in vivo*.

Claims 69(canceled).

Claim 70(previously presented). A plasmid DNA polynucleotide which is non-replicating in eukaryotic cells *in vivo*, comprising:

a) a eukaryotic transcriptional promoter;

b) an open reading frame 3' to the transcriptional promoter encoding an immunogenic HIV epitope wherein the open reading frame has a splice donor sequence at the 5'-side of the open reading frame, a REV responsive element anywhere within the open reading frame, and a stop codon encoding the termination of translation of the open reading frame;

c) an internal ribosome entry site (IRES) 3' to the translation stop codon of the open reading frame;

d) an open reading frame encoding a spliced HIV REV gene at the 3' end of which is a translation stop codon;

e) optionally, 3' to the REV translation stop codon, a second IRES, followed by an open reading frame encoding immunomodulatory or immunostimulatory genes being selected from the group consisting of GM-CSF, IL-12, interferon, and a B7 protein; and,

f) a transcription-termination signal 3' of the most downstream open reading frame of step d) or optionally, step e).

Claim 71(previously presented). A plasmid DNA polynucleotide which is non-replicating in eukaryotic cells *in vivo*, comprising sequences encoding:

a) a eukaryotic transcription initiation signal;

b) an HIV gene open reading frame (ORF) preceded by a heterologous leader sequence such that expression of the HIV gene ORF does not depend on availability of the HIV REV gene product;

c) a sequence which operates as an internal ribosome entry site (IRES) 3' to the translation stop codon of the HIV ORF;

d) a sequence encoding an ORF of a T-cell costimulatory element 3' to the IRES; and

e) a transcription termination signal 3' to the translation stop codon of the T-cell costimulatory element.

Claim 72(previously presented). The plasmid DNA polynucleotide of Claim 71 wherein the HIV gene ORF in (b) is tPAgp120 or tPAgp160.

Claim 73(previously presented). A plasmid DNA polynucleotide which is non-replicating in eukaryotic cells *in vivo*, comprising sequences encoding:

a) a eukaryotic transcription initiation signal;

b) a first HIV gene open reading frame (ORF) preceded by a heterologous leader sequence such that expression of the HIV gene ORF does not depend on availability of the HIV REV gene product;

c) a sequence which operates as an internal ribosome entry site (IRES) 3' to the translation stop codon of the first HIV ORF;

d) a second HIV gene open reading frame (ORF) preceded by a heterologous leader sequence such that expression of the second HIV gene ORF does not depend on availability of the HIV REV gene product; and

e) a transcription termination signal 3' to the translation stop codon of the second HIV gene ORF.

Claim 74(cancelled).

Claim 75(previously presented). A plasmid DNA polynucleotide construct selected from the group consisting of V1Jns-(tat/rev SD), V1Jns-gp160$_{IIIB}$/IRES/rev $_{IIIB}$ (SD), V1Jns-gag-prt$_{IIIB}$ (SD), V1Jns-gag-prt$_{IIIB}$, V1Jns-tPA, V1Jns-tPA-gp120$_{MN}$, V1J-SIV$_{MAC251}$p28 gag, V1J-SIV$_{MAC251}$nef, and V1Jns-tat/rev/env.

Claim 76(currently amended). A [The] plasmid DNA polynucleotide [of Claim 50] which is non-replicating upon *in vivo* introduction into a mammalian cell and induces the co-expression of three gene products from a first cistron, a second cistron and a third cistron, wherein the first cistron contains an HIV *gag* gene or portion thereof which encodes a *gag* immunogenic epitope, the second cistron encodes a cytokine, and the third cistron encodes a T-cell costimulatory element, wherein the first, second and third cistron may be presented in any combination.

Claim 77(previously presented). The plasmid DNA polynucleotide of Claim 76 wherein the second cistron encodes an interleukin, an interferon, or GM-CSF, and the third cistron encodes a B7 protein.